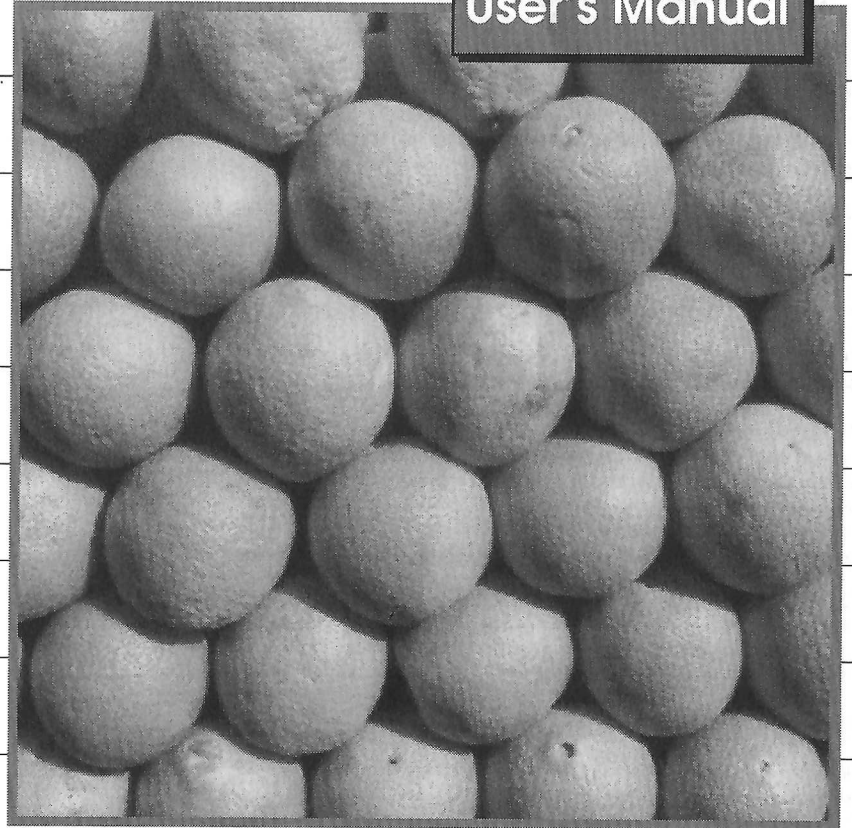


BRADFORD ARITHMETIC SOFTWARE

User's Manual



Bradford Arithmetic Software

Designed and developed by
Courses by Computers, Inc.
State College, PA.

WARRANTY

Apple Computer, Inc., International Business Machines Corp., Microsoft Corp., Courses by Computers, Inc., and William K. Bradford Publishing Company, Inc. make no warranties, either expressed or implied, regarding the enclosed computer software package, its merchantability, or its fitness for any particular purpose. The exclusion of implied warranties is not permitted by some states. The above exclusion may not apply to you. This warranty provides you with specific legal rights. There may be other rights that you may have, which vary from state to state.

William K. Bradford Publishing Company, Inc. warrants the enclosed diskette(s) on which the program is recorded to be free of any defects in materials and faulty workmanship under normal use for a period of 30 days after purchase. In the event you receive a defective diskette, you may receive a replacement diskette by sending the defective diskette, postage prepaid, to:

William K. Bradford Publishing Company
310 School Street
Acton, MA 01720

RESTRICTIONS

This Program is sold with a single-user license for use on one computer. Lab Packs and Network/ Site License versions are available. Call 1-800-421-2009 for further information.

This software package is protected by federal copyright law and international treaty. By law, you, the end user, may do the following: **a)** make **one copy** of the software **solely for backup** or archive purposes; or **b)** transfer the software to a **single** hard disk, provided that you keep the original solely for backup or archive purposes. **Copyright Law prohibits you from making any other copy** of the software or documentation for any other reason without our written permission.

Copyright© 1990,1988 by William K. Bradford Publishing Company, Acton, Massachusetts, U.S.A. All rights reserved. No part of this manual or disk may be reproduced or transmitted in any form by any means electronic or mechanical, including photocopy, recording, or any information storage or retrieval system, without permission in writing from the publisher.

The graphic character, Micro, is a trademark of Courses by Computers, Inc.

Apple® is a registered trademark of Apple Computer, Inc.

IBM® is a registered trademark of International Business Machines, Inc.

MS-DOS® is a registered trademark of Microsoft Corporation.

Printed in the United States of America

ISBN 1-55930-126-0

Introduction

The Bradford Arithmetic Software has been developed to complement the K-8 mathematics programs. It serves as a supplemental aid to the learning of basic arithmetic concepts and skills.

This program has been an extremely useful tool in the elementary and middle schools. It allows students to reinforce the classroom program, providing supplemental instruction, and an opportunity to practice skills.

Each lesson contains both tutorial and practice segments. Each practice question offers praise for correct answers and corrective help when necessary.

The disk also contains tests that measure the learner's progress in each of the skills addressed in the practice lesson, as well as a comprehensive Diagnostic Check across all skills tested on a disk.

The Computer

The Bradford Arithmetic Software runs on an Apple® II+, IIe, IIfx, or IIGS (normal speed setting) computer with 64K of memory, or an IBM PC or compatible micro computer with 128K memory and Color/Graphics Adaptor Card for IBM. Student testing requires two disk drives to record data for use with the management system.

MS-DOS Users: If you are using a version of DOS more recent than 2.0, there may not be sufficient space on the Bradford Arithmetic Software disk for completion of the installation. In this case, boot up from a separate DOS disk. At the prompt, insert the Bradford Arithmetic Software disk, type **GO** or **MENU** and press **ENTER**.

Special Keys

Pressing the **RETURN** key (or the **ENTER** key in MS-DOS) records a user's choice. Prior to that, an answer can be easily changed by pushing the left or right **ARROW** key.

Press the **X** key while holding down the **CONTROL** key to exit from a lesson and return to the menu.

Press the **CONTROL** key and **Q** key to quit the session and return to the title screen.

Press the **CONTROL** key and **O** key to turn the sound on or off.

Press the **CONTROL** key and **J** key to jump over a learning objective. This is available when the objective title page appears on screen.

Press the **CONTROL** key and **P** key to obtain an additional set of Practice items. This option is available only when it appears on the screen, at the end of an exercise set.

MS-DOS users: Press the **CONTROL** key and **E** key to exit the program and return to DOS.

The following is used in some packages:

Press the up and down **ARROW** keys or the **I** and **M** keys to move through a list of words. (These keys are available whenever a learner must make a selection from a list of words.)

To enter an answer in fraction form, the learner should use the following sequence of keypresses:

- 1) Type the numerator.
- 2) Press the slash key (/).
- 3) Type the denominator.
- 4) Press **RETURN**.

To enter an answer in mixed number form, the learner should use the following sequence of keypresses:

- 1) Type the whole number.
- 2) Press the **SPACE BAR**.
- 3) Type the numerator.
- 4) Press the slash key (/).
- 5) Type the denominator.
- 6) Press **RETURN**.

The Menu

After the title page appears, the user is asked to type his or her first name. The menu will follow and the user is free to choose the lesson he or she wants. Please be advised that the lessons must be studied and mastered in sequence for effective learning. If using MS-DOS, the user may also select the mastery tests from the menu.

The Lessons

The Bradford Arithmetic Software is designed as a supplemental aid to the learning of basic arithmetic concepts and skills.

The lessons may be used to provide supplemental instruction. The tutorial segments can reinforce a classroom presentation and help a learner who has missed a presentation relating to a specific skill. An advanced learner may choose to study new concepts independently.

The lessons also provide the learner with a means for reviewing a wide array of concepts quickly and easily. Learners might want to use the lessons in this way to review prerequisite skills before beginning a new unit of study.

The Tests

After progressing through the lessons, the tests (found on side 2 of the Apple disks), provide a tool for assessing the learner's level of achievement. The first test, the Diagnostic Check, is designed to check for all the competencies addressed by the other tests. Each of the remaining tests is a mastery check designed to determine if the learner is proficient in one specific skill. During all tests, except the Diagnostic Check, a tally is kept at the top of the screen of the number of items answered correctly. Each test will terminate whenever mastery or non-mastery has been determined. Mastery ranges between 75% and 85%, depending upon the individual test. Also, the design of the Diagnostic Check is such that the learner will never need to answer more than 20 questions.

Since every test is constructed by drawing randomly from a large bank of items, learners can select the same test numerous times without repeating the same set of test items.

When a learner demonstrates mastery, a Learning Report will appear onscreen. The report will show shaded areas corresponding to the skills that the learner has mastered. In cases where a higher level skill has been mastered, the report will show the prerequisite skills also shaded, assuming that the learner has these mastered as well.

When it is displayed on screen, you may print a copy of the Learning Report. **Apple Users:** pressing the P key while holding the **CONTROL** key down will print out a copy of the Learning Report. **MS-DOS Users:** follow the **Print Screen** instructions for your particular computer. A printed copy of a Learning Report shows the name of the learner at the top of the page and uses asterisks to show those skills that have been mastered.

The procedure for recording data from the tests onto the Management System requires two disk drives. Please refer to the User's Manual provided with the Management System package for specific instructions.



William K. Bradford Publishing Company, Inc.
310 School Street
Acton, MA 01720